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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/791,754	03/04/2004	Muneaki Ikeda	016907-1609	5263
22428	7590	02/23/2006	EXAMINER	
FOLEY AND LARDNER LLP SUITE 500 3000 K STREET NW WASHINGTON, DC 20007			MYERS, PAUL R	
		ART UNIT	PAPER NUMBER	
		2112		

DATE MAILED: 02/23/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/791,754	IKEDA, MUNEAKI	
	<b>Examiner</b>	<b>Art Unit</b>	
	Paul R. Myers	2112	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 18 October 2004.  
 2a) This action is FINAL.                    2b) This action is non-final.  
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1-10 is/are pending in the application.  
 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
 5) Claim(s) \_\_\_\_\_ is/are allowed.  
 6) Claim(s) 1-10 is/are rejected.  
 7) Claim(s) \_\_\_\_\_ is/are objected to.  
 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.  
 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) All    b) Some \* c) None of:  
 1. Certified copies of the priority documents have been received.  
 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | Paper No(s)/Mail Date. _____ .  |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>3/4/04</u> . | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
|   | 6) <input type="checkbox"/> Other: _____ .                                  |

**DETAILED ACTION*****Claim Rejections - 35 USC § 103***

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-4, 8-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Watson et al PN 6,040,792 in view of Lee PN 5,752,049.

In regards to claims 1, 4, 8: Watson teaches an interface apparatus (10) comprising: a USB interface portion (12) which makes communication with an external first device (Host) via a USB cable (Universal Serial Bus); a parallel interface portion (20) which makes communication with an external second device (Printer) via a parallel cable (IEEE 1284); and a control portion (14,16,18) which “provides support for all printer class device commands” (Column 5 lines 15-27) one of those commands would be the print command which would include print command to a suspended printer. Watson however is silent upon the standard method of waking up a suspended printer. Lee teaches sending a print command to a printer that is in power saving mode, including a print command signal being received from a host device (704) when the printer is in a power saving mode (702) then generating a switch signal (706) for switching the current power saving mode to a normal mode; and after it has been detected that the second device has been switched into the normal mode (710 Yes branch), controls the processing command so as to be supplied to the second device (712). It would have been

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obvious to a person of ordinary skill in the art at the time of the invention to include wake up control of the printer in the interface of Watson because this would have allowed Watson's interface to provide "support for all printer class device commands".

In regards to claims 2, 9: Watson teaches a printer and a print command.

In regards to claim 3: Watson teaches a buffer for storing data packets (16).

3. Claims 5-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Watson et al PN 6,040,792 in view of Lee PN 5,752,049 as applied to claim 4 above, and further in view of Walmsley et al PN 6,450,605.

In regards to claims 5, 6 and 10: Watson teaches converting between USB and IEEE 1284. Watson does not teach the claimed GET\_PORT\_STATUS and SOFT\_RESET. Walmsley teaches (Column 9 line 62 to Column 10 line 2) that the USB class definition for printers provides for emulation of IEEE 1284 ports. This allows the host to determine printer capabilities (via GET\_DEVICE\_ID), obtain printer status (via GET\_PORT\_STATUS) and reset the printer (via SOFT\_RESET). It would have been obvious to have Watson's interface, that interfaces a USB host to a IEEE 1284 printer, to use the USB/IEEE 1284 emulation because this is part of the USB standard that Watson uses.

4. Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Watson et al PN 6,040,792 in view of Lee PN 5,752,049 as applied to claim 4 above, and further in view of Blair et al PN 5,504,929.

In regards to claim 7: Watson teaches using the IEEE 1284 standard. Lee teaches waking the printer. Watson in view of Lee does not expressly teach what signal is used to wake the printer. Blair teaches the nInit signal in the IEEE 1284 when low, causes the input buffer to be cleared, the peripheral device's logic to be reset, and in the case of a printer, the print head is returned to the left margin (Column 1 lines 18-28). It would have been obvious to use the nInit signal to wake up the printer because this would have caused the printer to be set to a predetermined ready state.

### ***Conclusion***

5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure..

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Paul R. Myers whose telephone number is 571 272 3639. The examiner can normally be reached on Mon-Thur 6:30-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rehana Perveen can be reached on 571-272-3676. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



PAUL R. MYERS  
PRIMARY EXAMINER

PRM  
February 15, 2006